

ABSTRACT

A method and apparatus for continuously or repeatedly monitoring road surface friction utilizes a separate test wheel attached to a vehicle and in contact with a road surface and a device for detecting slippage of the test wheel resulting from applying either a braking or accelerating torque on the test wheel. A signal corresponding to the applied braking or accelerating torque at the moment slip is detected and used to provide an indication to the driver of the slip condition. The method and apparatus is useful in vehicles as well as aircraft or in other applications where it is desired to monitor road friction. An embodiment of the invention applies and maintains a measured vertical force to the surface of the test wheel of the friction monitor utilizing an electromagnetic force field under processor control. The processor can combine signals from the vertical force torque motor circuit, and the test wheel torque motor circuit.